

AMENDMENT UNDER 37 C.F.R. § 1.111  
Application No.: 10/510,286

Attorney Docket No.: Q83707

**AMENDMENTS TO THE DRAWINGS**

Replacement Drawings - Figures 4, 6 and 9.

Attachment: Replacement Sheet(s)

**REMARKS**

Claims 1-12, all the claims pending in the application, stand rejected. Claims 1 and 4-6 are amended. Claims 2 and 3 are cancelled.

***Claim to Priority***

Applicants have claimed foreign priority from Japanese application 2002-110395 and domestic priority from PCT application No. PCT/JP03/04610. Acknowledgment of Applicants' claim and receipt of the priority document from the International Bureau is respectfully requested.

***Drawings***

The drawings are objected to under 37 CFR 1.83(a) because Fig. 4 fails to show "one-dot-chain" as described in the specification (section [0072]).

Applicants are providing a replacement drawing for Fig. 4 as well as Figs. 6 and 9, which are corrected in the same manner as Fig. 4. Approval of the replacement drawings is respectfully requested.

***Claim Rejections - 35 USC § 103***

Claims 1-12 are rejected under 35 U.S.C. 103(a) as being unpatentable over Yano et al. (US Patent No: 6,515,645 B1) in view of Takeshi (Japanese Publication Number: 2000-003144). This rejection is traversed for at least the following reasons.

First, Applicants have amended independent claims 1 and 6 to incorporate the limitations of claims 2 and 3. Thus, these claims now recite (1) that "an output signal from the data-side integrated circuit to the segment electrode is generated so that an output potential is varied for each predetermined period" and (2) that "the output potential varied for each predetermined period is made within a voltage range of the potential of the common electrode, thereby suppressing a direct-current component caused by a difference between the potential of the data output signal and the potential of the common electrode."

Second, as to the added limitations, the Examiner asserts that Yano teaches that the output potential varied for each predetermined period (Fig. 1; where each period is where the polarity inverses). The Examiner also asserts that the variation is made within a voltage range of the potential of the common electrode (Fig. 1, items 122, 125), thereby suppressing a direct

current component caused by a difference between the potential of the data output signal and the potential of the common electrode. However, Applicants respectfully submit that the claim limitation is not shown in Yano et al or Takeshi.

Specifically, the added claim limitation relates to the range of the potential of the pictogram (i.e., 0 to 4.0V) that is within the range of the potential of the common electrode (i.e., -0.5 to 4.5V) as shown in Fig. 6 of the present application and explained at pages 24-31. As explained at pages 28 and 29, the common power supply voltage 70 is an AC signal that is applied to the first pictogram electrode 23 and its potential is varied between -0.5 and 4.5V. The first pictogram waveform 71 varies in potential between 0 and 4.0 volts, such that the potential values correspond to read data. Similarly, as explained at pages 29 and 30, the voltage 70 is applied to the second pictogram electrode 24 and the second pictogram waveform 72 varies in potential between 0 and 4.0 volts, and corresponds to read data.

As explained at pages 30 and 31, when the common power supply voltage 70 is taken as a reference, differences in potential can be taken for each of the first pictogram waveform 71 and second pictogram waveform 72 such that no average direct current component is generated. This feature results in less deterioration and stain in connection with grey tone adjustment. This improved result is attained by permitting the range of the potential of the pictogram to be in the range of the potential of the common electrode.

Neither Yano et al or Takeshi discloses that the range of the potential of a pictogram is within the range of the potential of the common electrode.

Accordingly, Applicants respectfully submit that claims 1 and 6, as amended to include this specific limitation not found in the prior art, nor obvious therefrom, should be considered allowable.

In view of the above, reconsideration and allowance of this application are now believed to be in order, and such actions are hereby solicited. If any points remain in issue which the Examiner feels may be best resolved through a personal or telephone interview, the Examiner is kindly requested to contact the undersigned at the telephone number listed below.

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The USPTO is directed and authorized to charge all required fees, except for the Issue Fee and the Publication Fee, to Deposit Account No. 19-4880. Please also credit any overpayments to said Deposit Account.

Respectfully submitted,

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